Abstract

In a packet-queue management system, a bandwidth allocation approach fairly addresses each of n flows that share the outgoing link of an otherwise congested router. According to an example embodiment of the invention, a buffer at the outgoing link is a simple FIFO, shared by packets belonging to the n flows. A packet priority-reduction (*e.g.,* packet dropping) process is used to discriminate against the flows that submit more packets/sec than is allowed by their fair share. This packet management process therefore attempts to approximate a fair queuing policy. The embodiment is advantageously easy to implement and can control unresponsive or misbehaving flows with a minimum overhead.